

ABSTRACT

The invention relates to an inductive sensor unit having one or more sensor coils, which have been mounted on a printed circuit board in a planar manner. According to the invention, a change in the inductance of the sensor coils caused by leakage currents in the conductive actuator is correlated with the position of the actuator with regard to the distance from the sensor coil and with the overlapping of the sensor (at a fixed distance). This provides the basis for an inductive momentary contact switch and an inductive position switching device. The invention also relates to the evaluation of the inductance, e.g. of the momentary contact switch such as in inductive proximity switches by incorporating the inductive sensors in an oscillating circuit. Alternatively, the change in inductance can also be detected by a reactance measurement. A relative evaluation of the influence of adjacent sensor coils is carried out in position switching devices.